Claims

1. Method for trimming birefringence of an integrated optical device with at least one waveguide having a birefringence characteristic, comprising the steps:

   - providing at least one electrode on top of the waveguide;

   - applying power equal to or above a predetermined power level to said at least one electrode for causing an irreversible birefringence change of the waveguide.

2. Method of claim 1, characterized by the step:

   - measuring the birefringence change, preferably with said at least one electrode by supplying electrical power to said electrode.

3. Method of any of the preceding claims, characterized in that said predetermined power level is 0.8 W/mm.

4. Method of any of the preceding claims, characterized in that said integrated optical device is an optical filter device.

5. Method of claim 4, characterized in that said integrated optical device is a thermo optical device.

6. Method of claim 5, characterized in that said optical filter is an Mach-Zehnder Interferometer or a ring resonator.

7. Method of any of the preceding claims, characterized in that said electrode is provided as a metal electrode, preferably as a chromium heater electrode.

8. Optical device for switching or filtering light passing a waveguide having a birefringence characteristic, characterized in that the waveguide has been treated according to a method of any of claims 1 through 7 as to change its birefringence irreversibly.

9. Optical device of claim 8, characterized in that said waveguide has a core layer sandwiched between a cladding layer, wherein both layers are made of a silica based material and the cladding is highly doped with a material adapted to balance stresses for TE and TM polarization modes.

10. Optical device of claim 8 or 9, characterized in that it is a Mach-Zehnder interferometer.

11. Optical device of claim 8 or 9, characterized in that it is a ring resonator.